

REMARKS

Reconsideration and allowance of the above-referenced application are respectfully requested.

I. STATUS OF THE CLAIMS

Claims 1, 8, 22, and 25 are amended herein and claims 18, 20, 21, 23, 24, and 26 are allowed.

In view of the above, it is respectfully submitted that claims 1-4, 8-12, 18, and 20-26 are currently pending and under consideration.

II. SPECIFICATION

In item 3 on page 3 of the Office Action, the Examiner indicates that the Applicant's title of the invention is not descriptive. However, as recited in claim 1, for example, the present invention clearly relates to a solid-state imaging element, which is the title of the Applicant's invention. As the Examiner points out, the title of the invention need only be clearly indicative of the invention to which the claims are directed.

In view of the above, it is respectfully requested that the objection to the title of the invention is overcome.

III. REJECTION OF CLAIMS 1-4, 22 AND 25 UNDER 35 U.S.C. § 102(B) AS BEING ANTICIPATED BY MORIMOTO (US 5,969,759)

The present invention as recited in claim 1 relates to a solid-state imaging element in which "said memory [is] formed of a plurality of line buffers, and the number of the plurality of line buffers arranged in the vertical direction is a value which is more than 1 and less than v, each of the plurality of line buffers stores h electrical signals."

Morimoto discloses that the horizontal CCD registers 102a-102d can store only signal charges corresponding to the partial image sensing area.

By contrast, in the present invention, each of the line buffers can store electrical signals corresponding to the full plurality of light-receiving sensors arranged in the horizontal direction. Therefore, Morimoto does not disclose the features as recited, for example, in claim 1 of the present invention.

Further, the Examiner directs Applicant's attention to FIG. 3 of Morimoto and alleges that "each imaging section 101a-d staged in the vertical direction has one register for multiple columns" is the same as "the number of the plurality of line buffers arranged in the vertical

direction is a value which is more than 1 and less than v " (as recited in claim 1).

However, Morimoto is silent regarding any teachings of the number of line buffers arranged in a vertical direction and merely describes vertical CCD registers 101-3. The Examiner instead relies on broad conclusory language and subjective belief in suggesting that Morimoto discloses "the number of the plurality of line buffers arranged in the vertical direction is a value which is more than 1 and less than v " as recited in claim 1.

Regarding claims 22 and 25, the Examiner again relies on the disclosure at column 7, lines 14-27 of Morimoto, and also asserts, "each imaging section 101a-d staged in the vertical direction has one register for multiple columns of the image sensor, making v greater [than] the number of registers or line buffers" (see Examiner's comments at item 2 on page 2 of the Office Action).

Contrary to the Examiner assertions, Morimoto clearly describes the image sensing areas 101a to 101d as being provided in the *horizontal* direction (see column 5, lines 17-18 and FIG. 3). Therefore, the imaging section 101a-d cannot be staged in a vertical direction as suggested by the Examiner.

Moreover, as mentioned in column 7, lines 14-27, Morimoto merely describes dummy vertical transfer electrodes, which are not the same as a plurality of line buffers arranged in a vertical direction and being less than a number of the photosensors arranged in the vertical direction (see claim 1). According to Morimoto, the signal charges of the individual image sensing areas 101a-101d, transferred to the horizontal lines, which are shifted by the differences in the numbers of stages of the dummy vertical transfer electrodes, are transferred to the respective horizontal CCD registers 102a-102d. Thus, there is nothing in Morimoto that discloses or suggests "a plurality of k line buffers, each line buffer holding up to m pixels of image data, and the number of the plurality of line buffers arranged in the vertical direction is a value which is more than 1 and less than v , each of the plurality of line buffers stores h electrical signals" (see claim 22).

Similar to claim 22, claim 25 recites, "the plurality of line buffers is arranged in a vertical direction and is a value which is more than 1 and less than v , each of the plurality of line buffers stores h electrical signals." Therefore, Morimoto does not disclose the features as recited in claims 22 and 25 of the present invention.

Claims 2-4 depend from claim 1 and distinguish over Morimoto for at least the same reasons as claim 1.

In view of the above, it is respectfully submitted that the rejection is overcome.

IV. REJECTION OF CLAIMS 8-12 UNDER 35 U.S.C. § 103(A) AS BEING UNPATENTABLE OVER MORIMOTO (US 5,969,759) IN VIEW OF JUEEN (US 5,818,524)

The comments in section IV above also apply here because it is described how Morimoto does not disclose or suggest the features as recited, for example, in claim 1, particularly the feature "wherein the number of the plurality of line buffers arranged in the vertical direction is a value which is more than 1 and less than v, each of the plurality of line buffers stores h electrical signals." Similar to claim 1, independent claim 8 recites, "an electrical signal holder within said solid-state imaging element comprising line buffers, wherein the number of the plurality of line buffers arranged in the vertical direction is a value which is more than 1 and less than v, each of the plurality of line buffers stores h electrical signals." Therefore, Morimoto and Juen, either alone or in combination, do not disclose or suggest the features recited in claim 8 of the present invention.

Claims 9-12 depend from claim 8 and distinguish over Morimoto and Juen for at least the same reasons as claim 8.

In view of the above, it is respectfully submitted that the rejection is overcome.

V. CONCLUSION

In view of the foregoing amendments and remarks, it is respectfully submitted that each of the claims patentably distinguishes over the prior art, and therefore defines allowable subject matter. A prompt and favorable reconsideration of the rejection along with an indication of allowability of all pending claims are therefore respectfully requested.

If there are any additional fees associated with filing of this Amendment, please charge the same to our Deposit Account No. 19-3935.

Respectfully submitted,

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